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Department of Lands and Forests

Fisheries and Oceans Pêches et Océans

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SPORT FISHING IN NOVA SCOTIA, 1985

Introduction

In 1985, a survey of sport fishing in Nova Scotia was conducted to provide basic information on the importance of the recreational fishery to the public, anglers, the sport fishing industry and to fisheries management agencies. The survey was conducted by the Wildlife Division of the Nova Scotia Department of Lands and Forests in cooperation with the Surveys Unit, Economic and Commercial Analysis Directorate of the federal Department of Fisheries and Oceans, Ottawa.

The 1985 survey is the third in a series of studies that has been carried out at five-year intervals. The surveys are part of a nationally coordinated study conducted by all of Canada's provincial and territorial sport fisheries agencies and several regional offices of the Department of Fisheries and Oceans. The results of the 1985 survey for Nova Scotia are summarized in this bulletin.

Seventy-five percent (989) of the questionnaires sent to persons who had purchased angling licences in Nova Scotia in 1985 were completed and returned to provide the basis for the information given in this report. The report highlights the major findings.

The Resource Base

There are 38 species of fish which inhabit the fresh water of Nova Scotia as well as some 300 marine species. Of these, approximately one dozen of each group are of interest to anglers. The main freshwater species include four species of trout, Atlantic salmon and smelt. White and yellow perch, bullheads and eels are widely distributed and regionally anglers may seek chain pickerel, smallmouth bass and tomcod. Marine species such as mackerel, cod, pollock, flounder and tuna are also available. Overall, brook trout is the most highly preferred and sought after species in Nova Scotia.

Nova Scotia's 55,000 square kilometers (21,400 square miles) includes about 6,700 lakes, 100 rivers, innumerable brooks and 7,442 kilometers (4,625 miles) of coastline. Most of the lakes and rivers are small and relatively infertile but the proximity of productive estuaries and marine habitat contribute to the production of some trophy-sized fish among anadromous species.

Most of the fresh water in Nova Scotia receives some angling pressure every year and overexploitation is a serious problem in the most accessible areas. There is little true wilderness fishing although some areas are still remote enough to provide a rewarding experience.

Angler Profile

There were 78,095 licensed anglers* in Nova Scotia in 1985, 97% (75,806) of whom were residents of the province (Table 1). Approximately 87% of residents and

* resident anglers under the age of 18 or over 64 do not require a general fishing licence.

Table 1. Numbers and characteristics of anglers in Nova Scotia in 1985.

	Resident	Nonresident		Total
		Canadian	Other	
Total Licensed Angling Population – Adults	75,806	1,030	1,259	78,095
Licensed Salmon Anglers	5,050	194	594	5,838
Active Adult Anglers				
– Males	57,662	910	1,155	59,727
(Average Age, Years)	38	42	48	38
– Females	8,243	61	85	8,389
(Average Age, Years)	38	42	42	38
Total	65,905	971	1,240	68,116
Resident Anglers Over 64 Years of Age	4,000	—	—	4,000
Children (under 18)*	29,649	243	170	30,062
Total Active Anglers* – All Ages	99,554	1,214	1,410	102,178

* Only includes households which had licensed anglers. The total number of anglers under the age of 18 was estimated at 112,000 in 1974.

Canada

97% of the 2,289 nonresidents fished. As well, 30,062 young people under the age of 18 living in licensed angler's households also fished, bringing the estimated population of active anglers in licensed households to 98,178. The number of anglers under the age of 18 is quite large, and their impact on the sport fishing of Nova Scotia is considerable. They are not covered in this survey.

Eighty-seven percent of the active resident adult anglers and 93% of the active nonresident adult anglers were male (Figure 1). The average age of all anglers was 38 years.

Approximately 45% of the nonresident anglers were Canadians, mainly from Ontario and New Brunswick. Almost all the remaining nonresidents were from the United States who came, for the most part, from the New England and Mid-Atlantic states (Table 2 and Figure 2).

Fig. 1. Sex composition of active anglers.

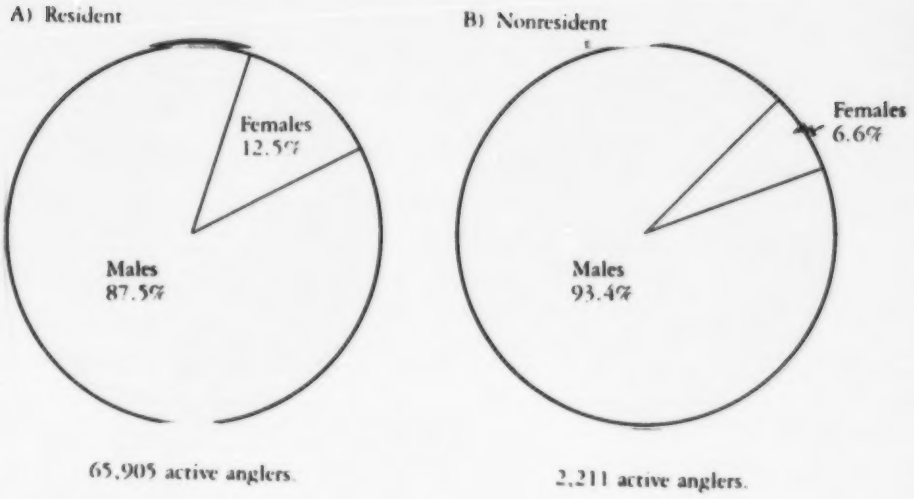


Table 2. Origin of nonresident licensed anglers in Nova Scotia in 1985.

Province-State Group	No.	%
Canadian		
Newfoundland-Labrador	6	0.3
Prince Edward Island	86	3.8
New Brunswick	176	7.7
Quebec	88	3.8
Ontario	497	21.7
Manitoba	8	0.3
Saskatchewan	8	0.3
Alberta	98	4.3
British Columbia	47	2.1
Northwest Territories	16	0.7
Canadian Total	1,030	45.0
Non-Canadian		
New England, U.S.A.	522	22.8
Mid-Atlantic, U.S.A.	315	13.8
East North Central, U.S.A.	109	4.7
West North Central, U.S.A.	50	2.2
Mountain, U.S.A.	26	1.1
Pacific, U.S.A.	11	0.5
South Atlantic, U.S.A.	172	7.5
East South Central, U.S.A.	7	0.3
West South Central, U.S.A.	36	1.6
Europe	11	0.5
Non-Canadian Total	1,259	55.0
Grand Total	2,289	100.0

Fishing Effort

Angling was a major recreational activity in Nova Scotia in 1985. Licensed resident anglers fished an average of 18.2 days, while nonresidents spent an average of 6.5 days at their sport. Anglers who reported purchasing a salmon licence fished considerably more than average with residents fishing 32.7 days and nonresidents 7.2.

In 1985, licensed anglers devoted a total of 1.2 million days to sport fishing in Nova Scotia (Table 3). Of these, 184,000 were reported to have occurred in salt water. No estimate of effort could be made for anglers under 18 years of age or over 64.

Resident angler effort was highest in Halifax and Cape Breton counties (Table 3 and Figure 3). Nonresidents preferred Inverness County, where they expended 30% of their fishing effort. Overall, Halifax, Cape Breton and Guysborough counties were the most heavily fished. The balance of the angling effort was fairly equally distributed among the other 15 counties of the province.

Sixty-four percent of resident anglers fished in only one county,, while 25% fished in two counties and 11% in more than two. For nonresidents the comparable figures were 64%, 23% and 13%. Among anglers who reported purchasing a salmon licence, 46% fished in one county, 23% in two counties and 31% in more than two. This indicates that salmon anglers travel more for their fishing and this is verified

Fig. 2. Regional distribution of United States residents who held Nova Scotia angling licences in 1985.

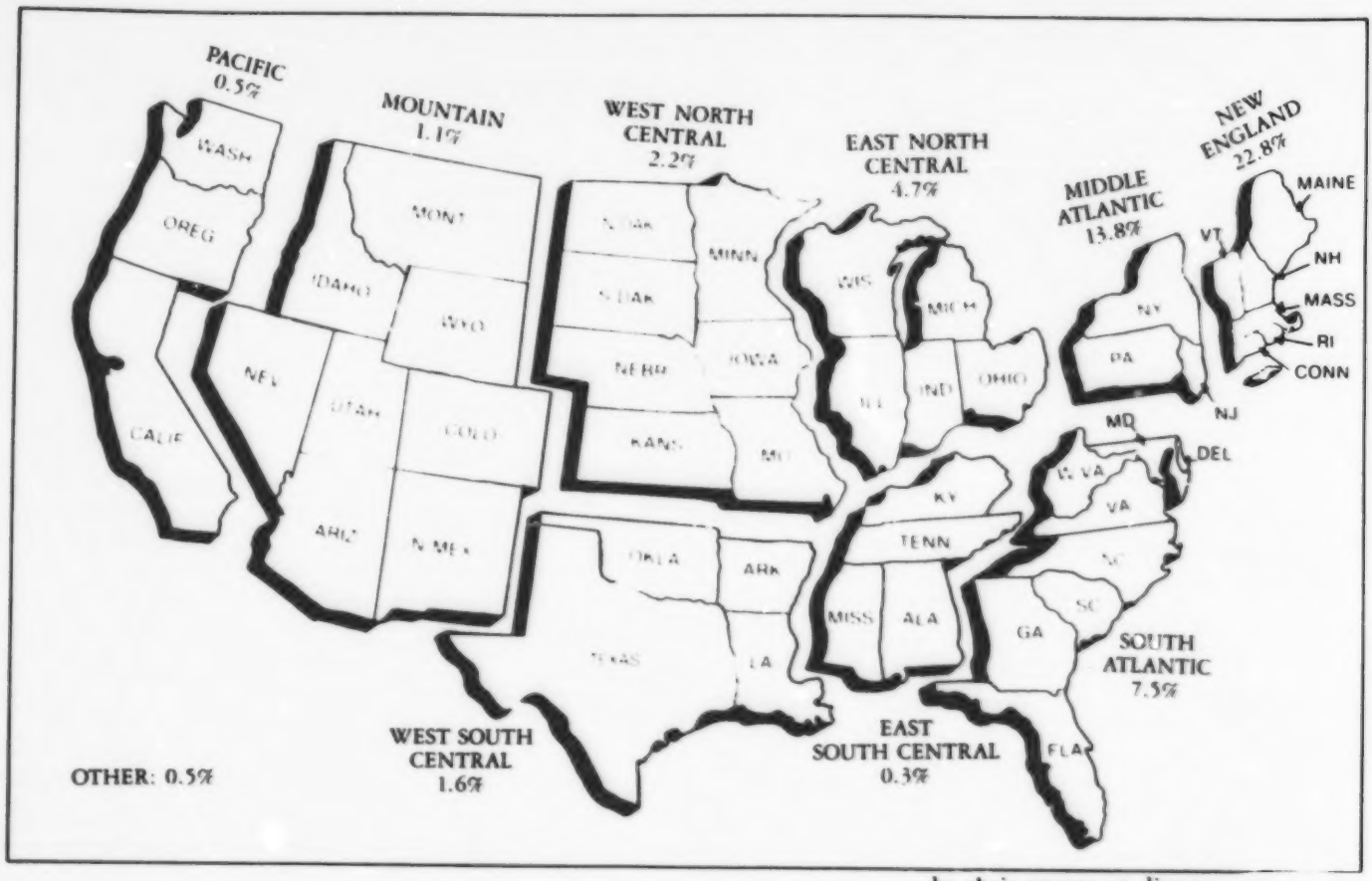


Table 3. Angling effort (in angler-days) by county in Nova Scotia in 1985.

County Fished	Days Fished					
	Resident		Nonresident		Total	
	No.	%	No.	%	No.	%
1. Yarmouth	26,626	2.2	303	2.0	26,929	2.2
2. Digby	31,250	2.6	324	2.2	31,574	2.6
3. Annapolis	45,843	3.8	271	1.8	46,114	3.8
4. Kings	58,094	4.8	180	1.2	58,274	4.8
5. Hants	55,232	4.6	227	1.5	55,459	4.6
6. Cumberland	66,366	5.5	1,375	9.4	67,741	5.6
7. Colchester	48,586	4.1	1,192	8.4	49,778	4.1
8. Pictou	81,615	6.8	338	2.3	81,953	6.7
9. Antigonish	24,822	2.1	386	2.7	25,208	2.1
10. Inverness	49,087	4.1	4,319	29.8	53,406	4.4
11. Victoria	63,888	5.3	385	2.7	64,273	5.3
12. Cape Breton	156,587	13.0	859	5.9	157,446	12.9
13. Richmond	22,151	1.8	548	4.0	22,699	1.8
14. Guysborough	91,902	7.6	1,532	10.6	93,434	7.6
15. Halifax	260,873	21.8	1,383	9.8	262,256	21.7
16. Lunenburg	79,267	6.6	483	3.3	79,750	6.6
17. Queens	24,232	2.0	250	1.7	24,482	2.0
18. Shelburne	15,053	1.3	105	0.7	15,158	1.2
Total	1,201,474	100.0	14,460	100.0	1,215,934	100.0

by their reports on distances travelled. The average angler in Nova Scotia drove 342 miles for fishing purposes in 1985 while those who purchased a salmon licence averaged 862 miles.

In most counties, the majority of fishing effort by Nova Scotian anglers was expended by residents of those counties (Table 4). For example, in Cape Breton county 96.8% of the effort in that county was expended by residents of the county. By contrast, in Victoria county only 17.8% of the effort was by residents of that county.

Anglers were specifically asked if they fished in the Bras d'Or Lake in Cape Breton and responses revealed that 4,497 residents and 62 nonresidents fished there a total of 35,954 days. They also indicated that on average Nova Scotian anglers fishing in fresh water spent 47% of their

Fig. 3. Angling effort by county in Nova Scotia in 1985.

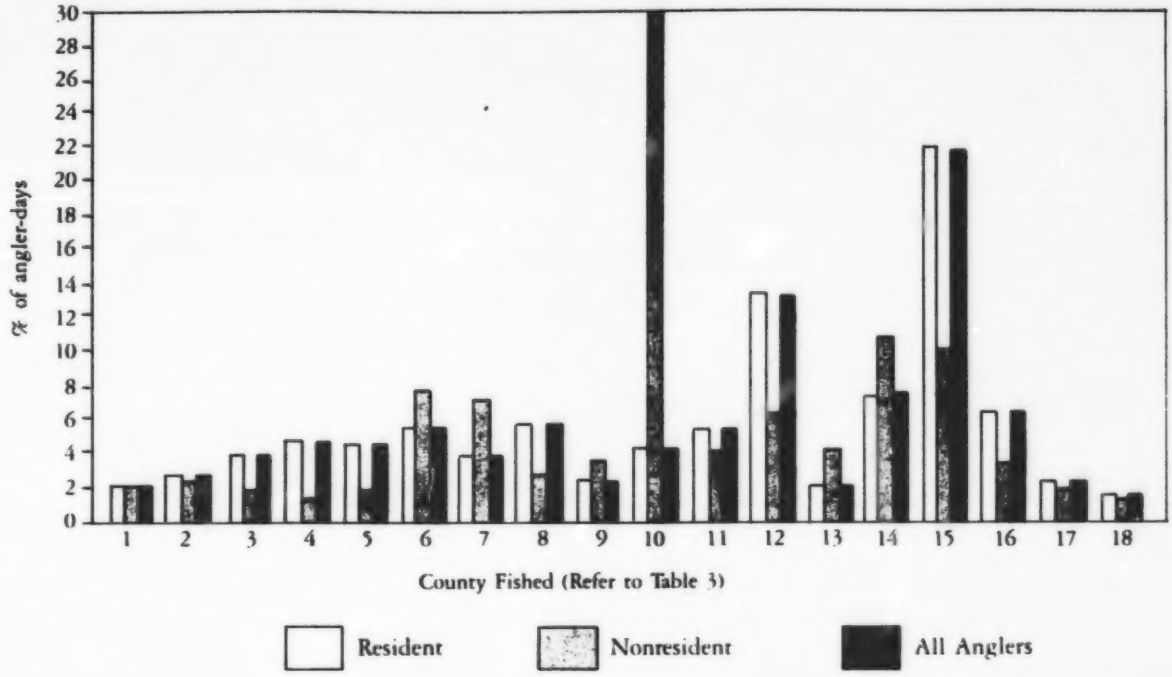


Table 4. Percent of fishing effort for each county by residents of the county and anglers from other counties.

County Fished	Effort by County Residents	Effort By Residents of Other Counties					
		1st		2nd		3rd	
	%		%		%		%
Cape Breton	96.8	Halifax	1.8	Inverness	1.1	Kings	0.3
Shelburne	95.1	Halifax	4.1	Cape Breton	0.7	—	—
Kings	88.1	Hants	5.3	Lunenburg	3.5	Halifax	1.9
Halifax	85.4	Hants	7.9	Colchester	3.3	Pictou	2.4
Yarmouth	85.2	Digby	4.1	Kings	4.1	Halifax	3.7
Pictou	85.1	Halifax	9.6	Colchester	2.9	Hants	0.9
Hants	81.1	Halifax	12.9	Colchester	2.4	Cumberland	1.4
Digby	80.0	Yarmouth	8.1	Annapolis	7.7	Kings	4.6
Cumberland	77.8	Colchester	15.6	Halifax	2.9	Pictou	1.2
Lunenburg	69.4	Halifax	16.7	Hants	5.7	Kings	4.7
Colchester	69.4	Cumberland	12.7	Halifax	9.4	Hants	6.5
Queens	65.7	Lunenburg	23.0	Kings	6.3	Halifax	2.7
Annapolis	59.8	Kings	21.2	Halifax	7.9	Queens	4.8
Inverness	55.4	Cape Breton	31.2	Halifax	9.3	Victoria	1.6
Antigonish	40.5	Pictou	44.9	Cape Breton	5.7	Halifax	4.0
Richmond	32.7	Cape Breton	56.9	Inverness	6.4	Colchester	1.5
Guysborough	28.2	Pictou	36.8	Halifax	13.2	Antigonish	12.6
Victoria	17.8	Cape Breton	77.1	Halifax	2.7	Colchester	1.2

time in lakes and 53% of their time in rivers and streams. Predictably, resident salmon anglers fished in rivers and streams 71% of the time while nonresident salmon anglers spent 98% of their time there.

Bait was the most popular gear type for resident anglers while nonresidents preferred fly fishing (Table 5). As might be expected, both resident and nonresident salmon anglers spent most of their time fly fishing.

Harvest

In 1985, licensed anglers caught an estimated 5.6 million fish of all species and retained 4.6 million, for a total of 2.3 million pounds or 1.0

Table 5. Percentage of time using gear types in Nova Scotia in 1985.

Licence Type	Salmon Licence	% of Time			
		Lure	Bait'	Lure & Bait	Fly
Resident	Yes	4.9	12.7	12.3	70.1
	No	10.0	48.6	28.5	12.9
	Total	9.6	46.0	27.3	17.1
Nonresident Canadian	Yes	0.3	0.6	0.9	98.2
	No	12.1	37.0	23.6	27.3
	Total	9.7	29.7	19.1	41.5
Nonresident Other	Yes	3.1	0.7	1.5	94.7
	No	25.6	3.6	8.5	38.6
	Total	15.0	13.9	5.1	65.1
TOTAL		9.7	45.2	26.8	18.3

million kilograms (Tables 6 and 7). Smelt, brook trout and mackerel were the species most frequently taken, with smelt and brook trout alone accounting for 77% of the harvest by number (Figure 4). Resident anglers caught 99% of all fish. Of the 67 fish retained, on average, 27 were smelt, 25 were brook trout and 5 were mackerel. Table 8 breaks down resident angler effort and catch by species. Brook trout were fished by 81% of resident anglers while only 2.8% fished for white perch. The catch per day ranged from 31 for smelt to 0.1 for Atlantic salmon.

Table 6. Numbers of fish caught by species by licensed anglers in Nova Scotia in 1985.

Fish Species	Resident	Nonresident	Total
Brook Trout	2,267,211	28,484	2,295,695
Rainbow Trout	274,724	2,159	276,883
Brown Trout	63,901	1,162	65,063
Atlantic Salmon	23,114	1,208	24,322
Smallmouth Bass	78,843	2,192	81,035
Yellow Perch	163,018	1,246	164,264
White Perch	30,019	739	30,758
Chain Pickerel	1,201	—	1,201
Smelt	1,858,225	1,213	1,859,438
Mackerel	323,022	4,538	327,560
Striped Bass*	18,606	22	18,628
Cod	131,819	1,097	132,916
Flounder	52,710	498	53,208
Pollock	82,386	1,650	84,036
Other Species	171,530	243	171,773
Total Number Caught	5,540,329	46,451	5,586,780

* Some confusion likely with White Perch.

Table 7. Numbers of fish retained by species by licensed anglers in Nova Scotia in 1985.

Fish Species	Resident	Nonresident	Total
Brook Trout	1,695,971	15,904	1,711,875
Rainbow Trout	227,477	1,288	228,765
Brown Trout	48,836	392	49,228
Atlantic Salmon	9,017	410	9,427
Smallmouth Bass	17,975	32	18,007
Yellow Perch	55,022	210	55,232
White Perch	10,813	723	11,536
Chain Pickerel	1,092	—	1,092
Smelt	1,844,463	1,205	1,845,668
Mackerel	321,106	4,368	325,474
Striped Bass*	8,772	—	8,772
Cod	117,509	872	118,381
Flounder	51,588	411	51,999
Pollock	23,074	220	23,294
Other Species	134,148	112	134,260
Total Number Retained	4,566,863	26,147	4,593,010
Weight of Fish Retained (in lbs)	2,258,777	20,367	2,279,144

* Some confusion likely with White Perch.

Fig. 4. Proportion of fish (by number) retained by active licensed anglers in Nova Scotia in 1985.

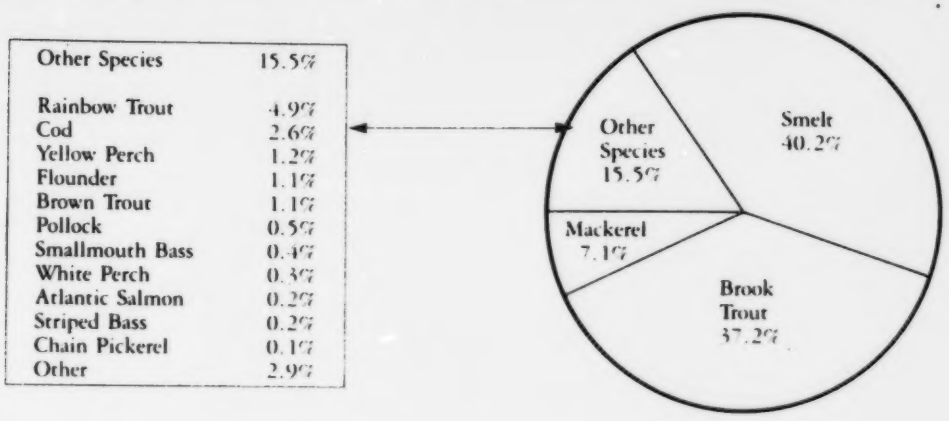


Table 8. Number of active resident anglers who reported fishing for each species, number of days fished by species and catch by species in Nova Scotia in 1985.

Species	No. of Anglers	% of Anglers	Number of Days	Days/ Angler	Catch*/ Day	Catch*/ Angler
Brook Trout	53,418	81.1	671,081	12.6	2.5	31.7
Rainbow Trout	20,068	30.5	188,574	9.4	1.2	11.3
Brown Trout	8,359	12.7	87,957	10.5	0.6	5.8
Atlantic Salmon	4,433	6.7	78,257	17.6	0.1	2.0
Smallmouth Bass	3,668	5.6	21,037	5.7	0.9	4.9
Yellow Perch	3,688	5.6	28,950	7.8	1.9	14.9
White Perch	1,828	2.8	9,048	4.9	1.2	5.9
Smelt	8,378	12.7	57,233	6.8	31.0	220.2
Mackerel	9,315	14.1	52,863	5.7	6.1	34.5
Striped Bass**	3,511	5.3	21,094	6.0	0.4	2.5
Cod	4,886	7.4	28,599	5.9	4.1	25.8
Flounder	2,999	4.6	17,289	5.8	3.0	17.2
Pollock	3,499	5.3	19,340	5.5	1.2	6.6
Others	5,088	7.7	65,072	12.8	2.1	26.4

* Caught and retained
** Some confusion likely with White Perch.

Table 9. Angler preference by species in Nova Scotia in 1985.

Preference Order	Resident	Preference Rating	Nonresident	Preference Rating
1	Brook Trout	49.5	Brook Trout	39.9
2	Rainbow Trout	14.1	Atlantic Salmon	30.1
3	Atlantic Salmon	10.4	Rainbow Trout	9.4
4	Brown Trout	6.1	Brown Trout	7.8
5	Mackerel	6.0	Smallmouth Bass	4.0
6	Smelt	4.0	Mackerel	2.3
7	Smallmouth Bass	3.2	Striped Bass	1.5
8	Striped Bass	1.8	Flounder	1.5
9	Cod	1.4	Cod	1.2
10	Perch	1.1	Perch	0.6
11	All Others	2.4	All others	1.7

Preferences

Brook trout was the preferred species for both resident and nonresident anglers in Nova Scotia in 1985 (Table 9). Rainbow trout was voted second spot by residents with Atlantic salmon third. This order was reversed among nonresidents. The salmonid family won 80% of the votes by residents and 87% for nonresidents.

Motivations

Most resident anglers who held Nova Scotia fishing licences in 1985 had also fished in the province

in 1981 (Table 10), however, only 35% of nonresident anglers had done so. Two-thirds of the residents and one quarter of the nonresidents had been fishing in Nova Scotia at the time of the previous survey 5 years ago.

Table 10. Fishing activity in Nova Scotia in the last five years (based on angler population in 1985).

Year of Activity	Resident	Non-resident	All Anglers
	%	%	%
1980	67.8	23.9	66.5
1981	69.9	23.9	68.5
1982	73.9	28.3	72.6
1983	78.9	33.2	77.6
1984	80.7	34.7	79.4

For 20% of nonresident anglers, Nova Scotia was the only place they fished in 1985. Fewer than 4,000 resident anglers (5% of licensed adult anglers) fished outside Nova Scotia in 1985, generally while on vacation. Of these, 44% fished in Newfoundland, 24% in New Brunswick and 16% in Ontario. Only 11% fished outside Canada.

Nonresident anglers made 8,188 trips to Nova Scotia in 1985, or about 3.6 trips per angler (Table 11). Fishing activity occurred on 40% of all trips anglers made to the province. For 90% of the trips on which they fished, fishing was either the main or secondary reason for visiting the province. Seventy-nine percent of their fishing trips to the province lasted more than a day (the average length of an overnight fishing trip was 13 nights). On these trips they stayed mostly with friends and relatives (41% of the time) or at cottages (17% of the time).

Residents and nonresidents alike listed water quality as the single most important factor that contributed to their enjoyment of a day of sport fishing in Nova Scotia (Table 12 and Figure 5). Second on their list was the natural beauty of the province. For resident anglers, the opportunity to fish for wild (as opposed to hatchery) fish was the third most important factor, while nonresidents considered access to wilderness areas as being very important. Other important factors were the chance to escape from the workday routine, favourable weather conditions, success in catching the desired species, the size of the fish caught and privacy from other fishing parties. Anglers ascribed little importance to catching fish for food and to the number of fish caught. Salmon anglers only varied slightly from the rankings assigned by the average angler.

Respondents were requested to choose one of four management options if fish populations were declining in particular areas due to overfishing (Table 13). Residents favored shorter seasons and size limits while nonresidents liked "catch and release" and lower bag limits. Anglers who purchased salmon licences wanted "catch and release" and size limits. For residents most of the "other" category requested stocking for a total of 6.5% of respondents.

In 1985, 59% of resident anglers also hunted in the province. Twenty percent were involved in nature photography, 19% in bird watching and 31% in feeding wildlife. All told, 79% of resident anglers were involved in wildlife related activities besides fishing in 1985. Approximately 11% of Nova Scotia anglers were members of a national or provincial wildlife organization or local fish and game club. Salmon anglers reported a participation rate of about 40%.

Table 11. Trip characteristics of nonresident anglers in Nova Scotia in 1985.

Characteristics	Number
Trips to Nova Scotia – All Reasons	8,188
Fishing Trips to Nova Scotia	3,292
– %	40
Days Spent For All Reasons	41,940
Days Fished	14,460
– %	34
Fishing Trips – Main Reason for Visit	1,508
– Secondary Reason	1,445
– Decided Upon After Arrival	252
Day Trips for Fishing	685
Overnight Trips for Fishing	2,607
Accommodation Used on Overnight Trips (% of nights)	
Friends and Relatives	41.3
Tent or Trailer	13.4
Cottages	17.4
Camping in Provincial Parks	2.5
Camping on Crown Land	1.1
Camping in Commercial Camp Grounds	4.7
Fishing Lodge or Camps	3.7
Commercial Accommodation	13.1
Other Accommodation	2.8

Expenditures and Investments

In 1985, anglers spent $15.2 million in Nova Scotia on activities and supplies connected with their sport (Table 14). Average expenditures per angler were $216 for residents and $423 for nonresidents. Resident salmon anglers reported an average expenditure of $468. Most of this money, 87% of it, was spent

Table 12. Relative importance of factors affecting fishing enjoyment in Nova Scotia in 1985.

Factors	Ranking Score		
	Resident	Nonresident	Salmon Anglers*
1. Quality of Water	13.7	14.4	15.2
2. Beauty of Surroundings	12.8	13.8	13.0
3. Angling Wild (not hatchery) Fish	11.3	9.8	11.5
4. Access to Wilderness Areas	10.7	11.2	11.6
5. Escape from Work or Routine	10.1	10.4	10.9
6. Privacy from other Fishing Parties	9.8	10.5	9.3
7. Weather Conditions	8.9	6.8	6.9
8. Catching Species Desired	8.4	9.5	10.4
9. Size of Fish Caught	7.2	6.3	6.1
10. Number of Fish Caught	4.7	5.6	3.8
11. Catch as a Source of Food	2.4	1.7	1.3

* Anglers who purchased a resident or nonresident salmon fishing licence.

Fig. 5. Importance of factors affecting fishing enjoyment in Nova Scotia in 1985.

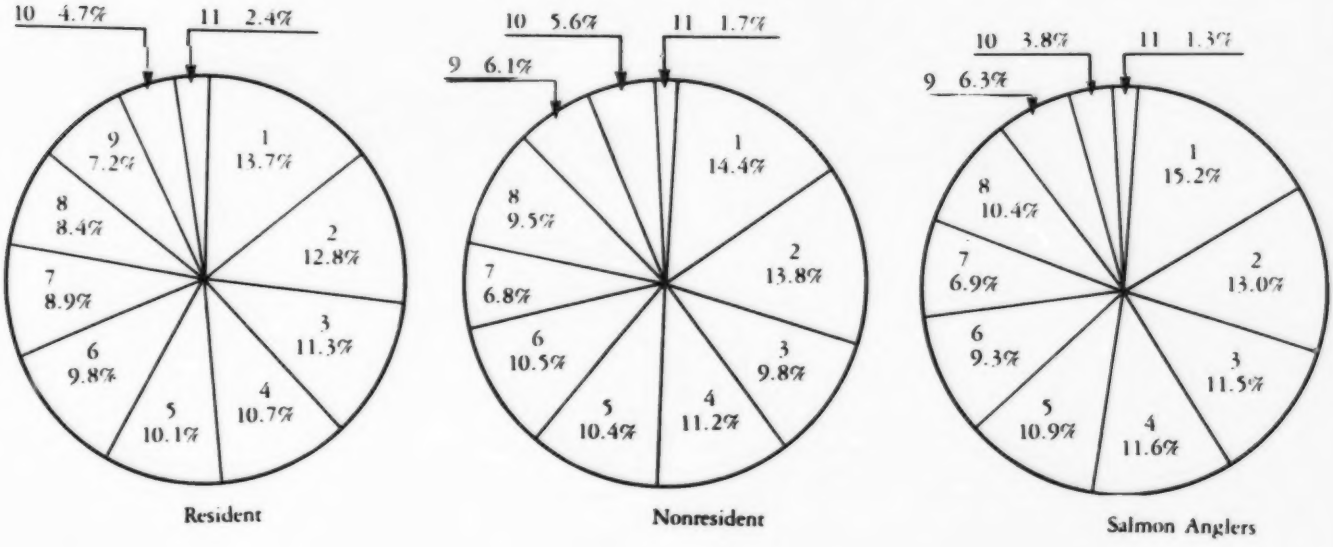


Table 13. Management options chosen by anglers when faced with problem of over fishing in Nova Scotia in 1985.

Options	% of Responses		
	Resident	Nonresident	Salmon Anglers
Shorter Season	27.2	7.8	14.5
Size Limit	28.4	16.0	21.5
Lower Bag Limit	18.1	25.5	19.0
Catch and Release	15.5	38.4	24.0
Other	10.8	12.3	20.9

Table 14. Expenditures directly attributable to sport fishing in Nova Scotia in 1985.

Expenditures	Resident	Nonresident	Total
	$	$	$
Food and Lodging	5,627,962	501,693	6,129,655
Transportation	6,622,171	194,125	6,816,296
Fishing Services	501,239	94,213	595,452
Fishing Gear	1,317,345	39,536	1,356,881
Packages	157,571	96,171	253,742
Other	37,776	9,162	46,938
Total	14,264,064	934,900	15,198,964
Average Per Active Angler	216.43	423.01	223.13

on food, lodging and transportation (Figure 6).

Nova Scotia anglers invested $48.8 million on major purchases and property, of which $19.2 million (39%) was attributed by anglers to their sport fishing activities (Table 15). Special vehicles (ATV's, snowmobiles, camper trucks, etc.) were the most popular items, accounting for almost half (46%) of the investments. Resident anglers were responsible for 99.8% of the investments.

Fig. 6. Proportion of expenditures attributable to sport fishing in Nova Scotia in 1985.

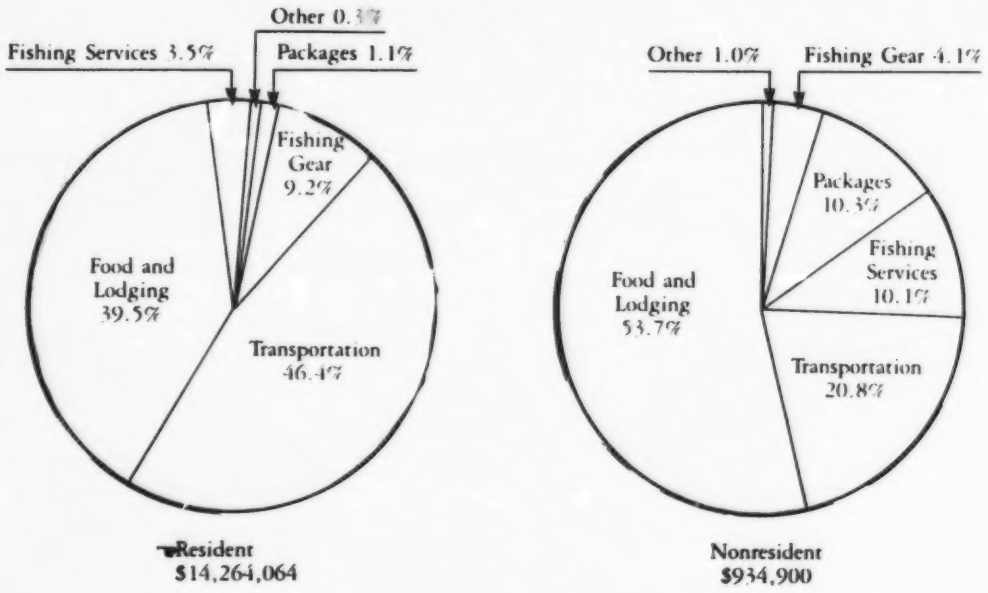


Table 15. Major purchases or investment relating in whole or in part to sport fishing in Nova Scotia in 1985.

Expenditures	Resident		Nonresident		Total	
	$	%*	$	%*	$	%*
Fishing Equipment	2,000,246	100.0	28,402	100.0	2,028,648	100.0
Boats and Related Equipment	6,276,900	63.0	2,502	100.0	6,279,402	63.0
Camping Equipment	4,853,485	46.0	1,910	73.0	4,855,395	46.0
Special Vehicles (ATV's etc)	22,274,511	27.0	—	—	22,274,511	27.0
Land-Buildings	12,310,640	34.0	43,024	32.0	12,353,664	34.0
Other	955,430	85.0	12,416	92.0	967,846	85.0
Total	48,671,212	39.0	88,254	65.0	48,759,466	40.0
Average Per Licence Holder	642.05	39.0	38.56	65.0	624.36	40.0
Total Attributable to Sport fishing	19,184,363	100.0	57,439	100.0	19,241,802	100.0

* Percentage wholly attributable to sport fishing.

Overall, Nova Scotia anglers spent a total of $64 million on goods and services in 1985, of which $34 million (54%) was considered directly attributable to sport fishing.

Additionally, anglers estimated the current market value of the sport fishing gear and equipment used by their households solely for sport fishing at $83 million. This included $29 million for boating equipment, $24 million for camping equipment and $14.5 million for fishing equipment.

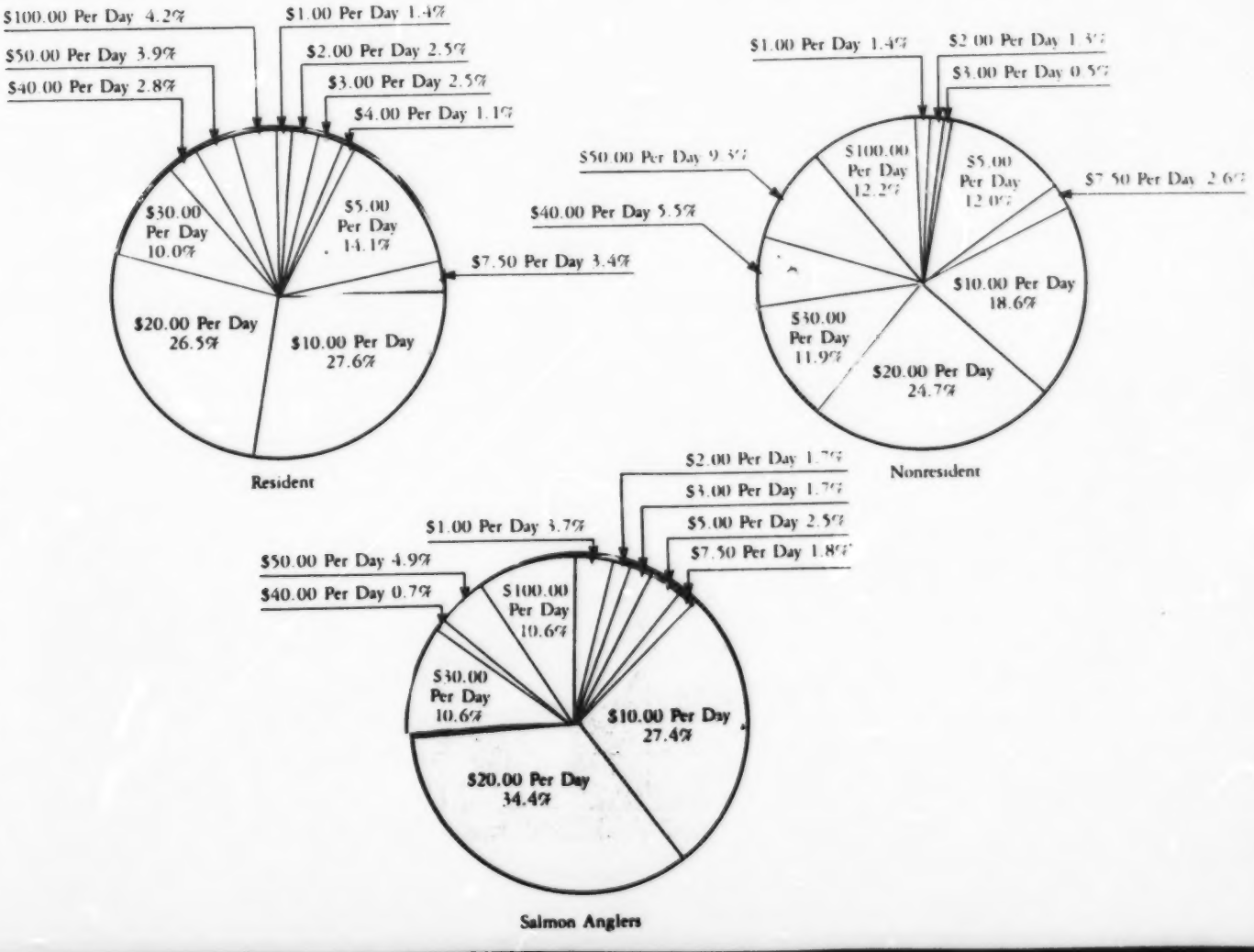
Willingness to Pay

Active anglers were asked "if your fishing costs had been higher in Nova Scotia in 1985 due to increased costs for gasoline, accommodation, supplies and other services, at what additional daily cost would you have

Table 16. Willingness of active anglers to pay additional costs for fishing in Nova Scotia in 1985.

Additional cost per day	Resident	Non-resident	Total	Lic. Salmon Holders
	%	%	%	%
$1.00	1.4	1.4	1.4	3.7
$2.00	2.5	1.3	2.5	1.7
$3.00	2.5	0.5	2.5	1.7
$4.00	1.1	—	1.0	—
$5.00	14.1	12.0	14.0	2.5
$7.50	3.4	2.6	3.3	1.8
$10.00	27.6	18.6	27.4	27.4
$20.00	26.5	24.7	26.5	34.4
$30.00	10.0	11.9	10.0	10.6
$40.00	2.8	5.5	2.9	0.7
$50.00	3.9	9.3	4.1	4.9
$100.00	4.2	12.2	4.4	10.6
	100.0	100.0	100.0	100.0

Fig. 7. Additional daily $ amount at which anglers would have decided not to go sport fishing in Nova Scotia in 1985.



decided not to fish?" Choices were given between $1.00 and $100.00 per day and the results are shown in Table 16 and Figure 7. Twenty-three percent of the anglers chose not to answer the question, but of those who did, $10 and $20 per day were the most common answers in all categories. The average daily amount given by residents was $19.48, by nonresidents $30.27 and by all salmon anglers $26.46.

Comparison with 1980 Survey Results

Resident licence sales decreased by 6% as compared to 1980, although the number of active anglers remained virtually unchanged. (Table 17). Nonresident licence sales increased by 4% as did active anglers. Total days fished by all licensed anglers was down 19% with angler days spent on the principal species, brook trout, down by 31%.

The total catch of all species combined was down 15%. Brook trout showed a decrease of 15% and smelt 27%.

Direct expenditures by all licensed anglers was 25% higher than in 1980. The major purchase or investment category totally attributable to sport fishing was up 146% but some of this difference was likely due to different wording of the question with a broader range of suggested categories in 1985.

Conclusion

The results of the 1985 survey of sport fishing in Nova Scotia confirm that angling is an important socio-economic component of the natural resource sector in the province. It is estimated that anglers spent $15.2 million on activities directly associated with fishing. These were monies spent on accommodation, food, travel, lures, licences, etc. Additionally, anglers invested $48.8 million on major durables and property in 1985, of which $19.2 million was wholly attributable to sport fishing. This amounts to a total of $34.4 million which anglers spent directly on angling in Nova Scotia in 1985.

Economists generally agree that the first round of expenditures in most segments of the business world do not adequately reflect the full impact on spending such as described above. As the money circulates into associated businesses, the economic effect increases by a factor of 1.5 or more. On this basis, the direct economic impact of sport fishing within the Nova Scotia economy was $52 million or greater in 1985.

Anglers also indicated they were prepared to spend an average of about $20 per day above their current costs in 1985 before they would stop fishing. Although this information has not yet been taken into consideration in addressing the total value of the fishery, it does indicate that anglers place more value on the resource than they currently spend.

Licensed anglers fished 19% fewer days in 1985 than they had in 1980, although the number of active anglers remained nearly the same. There has also been a 31% decrease

Table 17. 1980-1985 comparisons of angler characteristics/species harvest and expenditures in Nova Scotia.

	Resident			Nonresident			Total		
	1980	1985	% Change	1980	1985	% Change	1980	1985	% Change
Total Licensed Angling Population	80,429	75,806	−5.7%	2,200	2,289	4.0%	82,629	78,095	−5.5%
Total Active Adult Anglers	66,906	65,905	−1.5%	2,134	2,211	3.6%	69,040	68,116	−1.3%
Total Days fished('000)	1,487.9	1,201.5	−19.2%	15.4	14.5	−5.9%	1,503.2	1,215.9	−19.1%
Total Species Caught and Retained ('000)	5,388.1	4,566.9	−15.2%	37.9	26.1	−31.1%	5,426.1	4,593.0	−15.4%
Total Direct Expenditures ('000)	$11,620.9	$14,264.1	22.7%	$585.2	$934.9	59.8%	$12,206.1	$15,199.0	24.5%
Major Purchases and Investments ('000)	$14,085.6	$48,671.2	245.5%	$174.3	$88.3	−49.3%	$14,259.9	$48,759.5	241.9%
Total Attributable to Sport fishing ('000)	$7,698.5	$19,184.4	149.2%	$99.8	$57.4	−42.5%	$7,798.3	$19,241.8	146.7%

in the time they spent angling the preferred species, brook trout. This may well reflect decreasing availability of brook trout. Such a decrease is substantiated by other indicators.

Nova Scotian anglers indicated that they were more concerned about the fishing experience than they were about catching fish. They rated water quality and natural beauty as the two most important factors while size and number of fish caught were rated number nine and ten respectively. Although fish provide the focus for angling activity, other elements must be considered by managers in order to provide a quality recreational experience.

Fifty-nine percent of resident Nova Scotian anglers also hunted in 1985 and 79% reported that they were involved in wildlife related activities besides fishing in 1985. Obviously, many of the users of fish and wildlife resources take advantage of both components.

In summary, the average Nova Scotian angler in 1985 was 38 years old, strongly preferred to fish for brook trout and felt that water quality and natural beauty were the most important factors influencing a day's fishing. Bait was used most often with fishing activity in fresh water fairly equally divided between lakes and streams. This average angler fished on 18 days, while spending $500 and catching 82 fish. Sixty-seven of these fish weighing a total of 15 kilograms (33 pounds) were kept.

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